

# Work Order ID 77556

**\*77556\***

Page 1

December-13-11 1:41:41 PM

Item ID: D350-591-133

Accept

**\*N900040100\***

Setup Start **\*NS1\***

Revision ID:

Stop **\*NS2\***

Item Name: Aft Maintenance Step

Start Date: 13/12/2011 Start Qty: 5.00

**\*5\***

Cust Item ID:

Required Date: 05/01/2012 Req'd Qty: 5.00

**\*5\***

Customer:

Reference:

Approvals: Process Plan: MLJ Date: 11/12/13 Tooling: \_\_\_\_\_ Date: \_\_\_\_\_

QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_

Run Start **\*NR1\***

Stop **\*NR2\***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
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Draw Nbr	Revision Nbr
D2946	Rev B

100

0.00

**\*100\***

DOCUMENT CONTROL

DC

Memo

0.00

Document Control

Photocopy bluefile and type labels as per PPP D350-591-133 CHG003

110

0.00

**\*110\***

Large Fab

Large Fab

Memo

0.00

Large Fab

1-Cut D2622-120 extrusion to 62.06" long as per Dwg D2946

2-Deburr

\*\*Ensure that 57.09" minimum extrusion is kept and identify to be used for D350-591-215/-216.\*\*

*Handwritten notes:*  
 50  
 8 12/21/07  
 MLJ 12-1-25  
 (5)

*Handwritten notes:*  
 12.01.20  
 5  
 Ø

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

**NOTE:** Date & initial all entries

# Work Order ID 77556

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Item ID: D350-591-133 Accept **\*N900040100\*** Setup Start **\*NS1\***  
 Revision ID: Stop **\*NS2\***  
 Item Name: Aft Maintenance Step  
 Start Date: 13/12/2011 Start Qty: 5.00 **\*5\*** Cust Item ID:  
 Required Date: 05/01/2012 Req'd Qty: 5.00 **\*5\*** Customer:  
 Reference:

Approvals: Process Plan: \_\_\_\_\_ Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_ Run Start **\*NR1\***  
 QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_ Stop **\*NR2\***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
120 <b>*120*</b> QC Quality Control	QC6- Inspect dimensions to drawing  Memo	0.00  0.00		5/12/12		5			
130 <b>*130*</b> Large Fab Large Fab	Large Fab Memo 1-Deburr and Bevel ends for welding 2-Weld (1) End Cap and (2) Lugs using Jig DT8440 as per Dwg D2946 A/R Aluminum Rod 114518 117912 3-Grind End Cap welds flush	0.00  0.00				5	0		12-01-20
140 <b>*140*</b> QC Quality Control	QC9- Inspect visual per QSI004- Fusion Welds  Memo	0.00  0.00				5	0		BE 12-01-24

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

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**\*77556\***

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**\*N900040100\***

Setup Start \*NS1\*

Stop \*NS2\*

**\*5\***

**\*5\***

**Customer:**

**Reference:**

Run Start \*NR1\*

Stop **\*NR2\***

150 QC5- Inspect part completeness to step on W/O

0.00

**\*150\***

QC

## Memo

0.00

## Quality Control

160 Chemical Conversion Coat per QSI005 4.1

0.00

**\*160\***

HandFinish

## Memo

0.00

## Hand Finishing

170 QC3- Inspect Part Finish

0.00

\*170\*

QC

## Memo

0.00

## Quality Control

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

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**\*77556\***

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**\*N900040100\***

Setup Start \*NS1\*

Stop \*NS2\*

**\*5\***

**\*5\***

**Reference:**

Run Start \*NR1\*

Stop \*NR2\*

QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_

180

**\*180\***

0.00

## Memo

0.00

Remove alodine prior to welding. Weld end cap as per Dwg D2946. Grind end cap weld flush.

A/R AL ROD BATCH: 1145/4

QC10- Inspect visual per QSI004- ground welds	0.00
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**\*190\***

## Memo

0.00

## Quality Control

QC5- Inspect part completeness to step on W/O	0.00
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**\*200\***

## Memo

0.00

## Quality Control

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

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Item ID: D350-591-133

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**\*N900040100\***Setup Start **\*NS1\***

Revision ID:

Stop **\*NS2\***

Item Name: Aft Maintenance Step

Start Date: 13/12/2011 Start Qty: 5.00

**\*5\***

Cust Item ID:

Required Date: 05/01/2012 Req'd Qty: 5.00

**\*5\***

Customer:

Reference:

Approvals: Process Plan: \_\_\_\_\_ Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_  
QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_

Run Start **\*NR1\***Stop **\*NR2\***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
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210

Chemical Conversion Coat per QSI005 4.1

0.00

**\*210\***

HandFinish

Memo

0.00

Hand Finishing

5 BL 12-1-30.

220

White Gloss(Ref:4.3.5.1) per QSI005 4.3-Alum

0.00

**\*220\***

Powdercoat

Memo

0.00

Powder Coating

START TIME:

OVEN TEMPERATURE:

FINISH TIME:

8-10  
3200 F  
8-40

230

Wing Walk as per dwg QSI005 4.4 Batch 120125

0.00

**\*230\***

HandFinish

Memo

0.00

Hand Finishing

5 BL 12-1-315 BL 12-1-31.

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

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Item ID: D350-591-133 Accept **\*N900040100\*** Setup Start **\*NS1\***  
 Revision ID: Stop **\*NS2\***  
 Item Name: Aft Maintenance Step  
 Start Date: 13/12/2011 Start Qty: 5.00 **\*5\*** Cust Item ID:  
 Required Date: 05/01/2012 Req'd Qty: 5.00 **\*5\*** Customer:  
 Reference:

Approvals: Process Plan: \_\_\_\_\_ Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_ Run Start **\*NR1\***  
 QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_ Stop **\*NR2\***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
240	QC3- Inspect Part Finish	0.00							
<b>*240*</b>									
QC	Memo	0.00							
Quality Control									
250	Pick Kit	0.00							
<b>*250*</b>									
Packaging	Memo	0.00							
Packaging									
260	QC4- 100% Inspect kits for completeness	0.00							
<b>*260*</b>									
QC	Memo	0.00							
Quality Control									

5 4 11 12/01/31  
COUNT MEASURED

12/2/24 (SC)  
ESP 12-02-02.

S 210/10

(B)

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

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Item ID: D350-591-133

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**\*N900040100\***Setup Start **\*NS1\***

Revision ID:

Item Name: Aft Maintenance Step

Stop **\*NS2\***

Start Date: 13/12/2011 Start Qty: 5.00

**\*5\***

Cust Item ID:

Required Date: 05/01/2012 Req'd Qty: 5.00

**\*5\***

Customer:

Reference:

Approvals: Process Plan: \_\_\_\_\_ Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_  
QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_

Run Start **\*NR1\***Stop **\*NR2\***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
270	Packaging	0.00							
<b>*270*</b>									
Packaging	Memo	0.00							
Packaging	Identify and pack for shipping as per PPPD350-591-133								
	Location: <u>61</u>								
	PPP Rev: _____								
280	QC21- Final Inspection - Work Order Release	0.00							
<b>*280*</b>									
QC	Memo	0.00							
Quality Control									

SP12-02-08. (S)

M.C.J 12/02/09 (J)

M.C.J 12/02/09 (S)

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

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# Picklist Print

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Page 1

Work Order ID: 77556

**\*77556\***

Parent Item: D350-591-133

**\*D350-591-133\***

Parent Item Name: Aft Maintenance Step

Start Date: 13/12/2011

Required Date: 05/01/2012

Start Qty: 5.00

Required Qty: 5.00

Comments: IPP Rev:B05.10.14Modified step 10KJ/EC  
IPP Rev:B06.07.19D2946 @ rev.b EC

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
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D2622-120C

Manufactured No

110

Each

126.0200

0.52

2.6

**\*D2622-120C\***

Step Extrusion

\*\*

*12.01.20*

Location

Loc Qty

Loc Code

HALL

17.02

46910

2

64409

6

66970

7.7

68293

0.5

72131

0.82

WA013

109

75781

109

*5*

D2734

Manufactured No

130

Each

25.0000

2

10

**\*D2734\***

Step End Plate

\*\*

*12.01.20*

Location

Loc Qty

Loc Code

WA015

25

73416

25

*10*

D2944

Manufactured No

130

Each

18.0000

2

10

**\*D2944\***

Step Mounting Plate

\*\*

*12.01.20*

Location

Loc Qty

Loc Code

WA018

18

73427

18

*10*

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

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Work Order ID: 77556

**\*77556\***

Parent Item: D350-591-133

**\*D350-591-133\***

Parent Item Name: Aft Maintenance Step

Start Date: 13/12/2011

Required Date: 05/01/2012

Start Qty: 5.00

Required Qty: 5.00

AN4-11A

Purchased

No

250

Each

238.0000

4 20

**\*AN4-11A\***

Bolt

\*\*

SP

Location

Loc Qty

Loc Code

ST356

238

110382

1

115316

37

117872

100

118706

100

20K

AN4-14A

Purchased

No

250

Each

204.0000

8 40

**\*AN4-14A\***

Bolt

\*\*

m 120187 SP

Location

Loc Qty

Loc Code

ST357

104

118628

1

118706

3

119798

100

ST358

100

119449

100

AN4-16A

Purchased

No

250

Each

78.0000

8 40

**\*AN4-16A\***

Bolt

\*\*

SP 12-02-03

Location

Loc Qty

Loc Code

ST358

78

117872

28

118838

50

40K

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

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Work Order ID: 77556

\*77556\*

Parent Item: D350-591-133

\*D350-591-133\*

Parent Item Name: Aft Maintenance Step

Start Date: 13/12/2011

Required Date: 05/01/2012

Start Qty: 5.00

Required Qty: 5.00

AN4-7A

Purchased

No

250

Each

161.0000

2

10

\*AN4-7A\*

Bolt

\*\*

SP

Location

Loc Qty

Loc Code

ST356

161

117514

161

AN960JD416

NAS1149D0463J

Purchased

No

250

Each

0.0000

14

70

\*AN960JD416\*

Washer

\*\*

10X

M119075 SP.

D2230-1

Manufactured

No

250

Each

226.0000

4

20

\*D2230-1\*

Lug

\*\*

SP 78596 SPB  
12/2/11

Location

Loc Qty

Loc Code

ST480

226

67826

6

70974

3

72811

18

76640

199

D2230-3

Manufactured

No

250

Each

217.0000

4

20

\*D2230-3\*

Lug

\*\*

20 76x12x

B775601

SP 12-02-03

Location

Loc Qty

Loc Code

ST480

217

53881

4

70973

1

75546

14

76642

198

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

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Work Order ID: 77556

**\*77556\***

Parent Item: D350-591-133

**\*D350-591-133\***

Parent Item Name: Aft Maintenance Step

Start Date: 13/12/2011

Required Date: 05/01/2012

Start Qty: 5.00

Required Qty: 5.00

D2732

Manufactured No

250 f

359.0700 2 10

**\*D2732\***

Rubber Extrusion

\*\*

SP

Location

Loc Qty

Loc Code

ST410

359.07

70987

359.07

10x

cut (8) at 3.00"

D2856-400

Manufactured No

250 f

228.2445 1.26 6.3

**\*D2856-400\***

Abraison Strip

\*\*

SP

Location

Loc Qty

Loc Code

ST409

228.2445

63735

0.6696

68076

0.3149

71164

21.66

73491

205.6

6.3

(2X) 4.00" X 7.20" per dwg

D2945

Manufactured No

250 Each

8.0000 1 5

**\*D2945\***

Step Mounting Plate

\*\*

SP 12-02-03

Location

Loc Qty

Loc Code

ST027

8

70880

8

5x

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

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Parent Item: D350-591-133

**\*D350-591-133\***

Parent Item Name: Aft Maintenance Step

Start Date: 13/12/2011

Required Date: 05/01/2012

Start Qty: 5.00

Required Qty: 5.00

MS21042L4

Purchased

No

250

Each

9,264.000

14

70

**\*MS21042L 4\***

\*\*

SP

Nut

Location

Loc Qty

Loc Code

ST300

9264

117441

51

117601

342

118451

133

119017

3738

119075

5000

FOX

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

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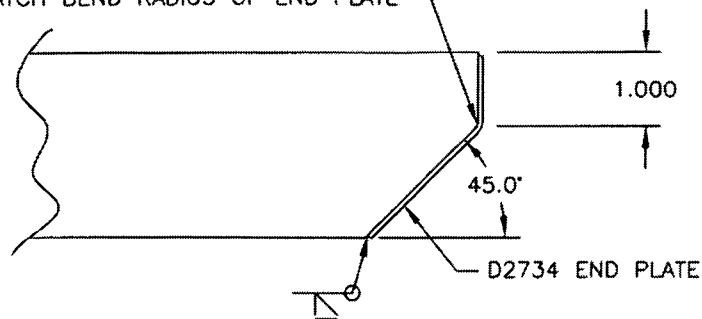
## D2946 STEP ASSEMBLY PARTS LIST

Part No.	Description	QTY
D2946	Step Assembly	X
D2622-63	STEP EXTRUSION*	1
D2734	END PLATE	2
D2944	STEP MOUNTING PLATE	2

\*cut per drawing

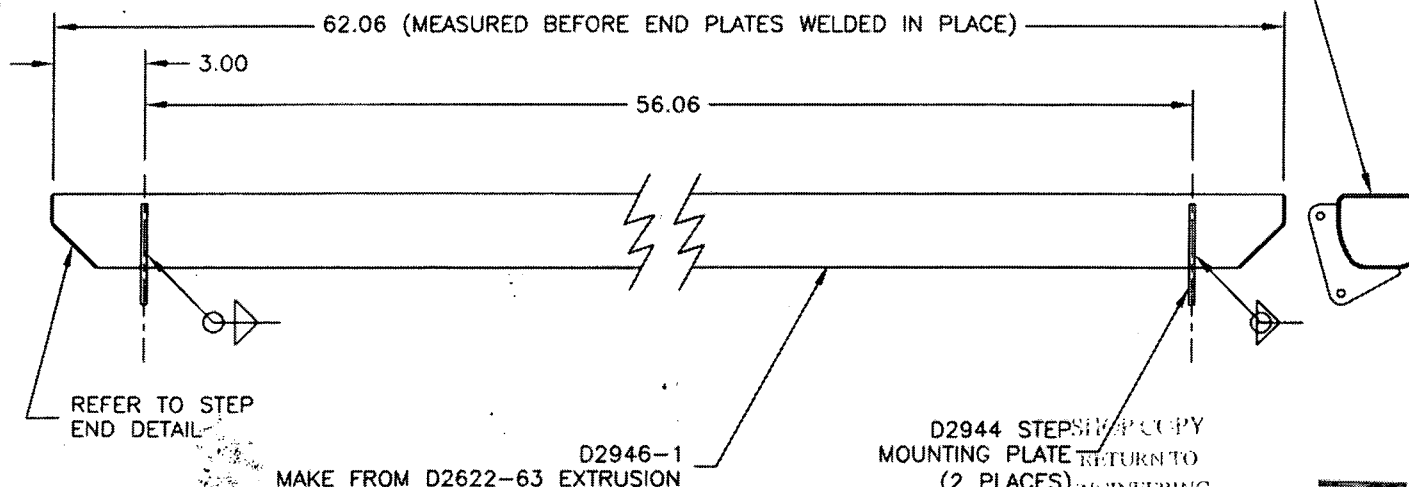
NOTE: ALL WELDS SHALL BE  
100% VISUALLY  
INSPECTED BY A  
QUALIFIED INSPECTOR  
PER DART QSI 004

ROUND CORNER OF EXTRUSION TO  
MATCH BEND RADIUS OF END PLATE



TYPICAL STEP END DETAIL  
NOT TO SCALE

APPLY BLACK ANTI-SKID  
ON TOP SURFACE TO  
BOTTOM OF TOP RADIUS



## D2946-041 STEP ASSEMBLY

### D2946 STEP ASSEMBLY

- 1) MAKE FROM D2622 STEP EXTRUSION
- 2) WELD PER DART QSI 004
- 3) FINISH: CHEMICAL CONVERSION COAT PER DART QSI 005 4.1  
POWDER COAT ENTIRE ASSEMBLY WHITE (4.3.5.1) PER DART QSI 005 4.3  
BLACK ANTI-SKID PAINT PER DART QSI 005 4.4
- 4) ALL DIMENSIONS ARE IN INCHES
- 5) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED

D2944 STEP MOUNTING PLATE  
RETURN TO  
(2 PLACES) ENGINEERING  
UNCONTROLLED COPY  
SUBJECT TO AMENDMENT  
WITHOUT NOTICE  
WORK ORDER  
NO. 77556 4.7.5  
11/12/13

RELEASED  
05.11.28

DESIGN	CP	DRAWN BY	PH	DART AEROSPACE LTD
CHECKED		APPROVED		HAWKESBURY, ONTARIO, CANADA
DATE	05.11.14	TITLE	D2946	REV. B
		STEP ASSEMBLY		SHEET 1 OF 1
		SCALE		1:6
		UPDATE FINISHING NOTE		

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

**NOTE:** Date & initial all entries

## 5. PARTS LIST

Qty -111A	Qty -113	Qty -115	Qty -117A	Qty -119	Qty -133	Part Number	Description
X						D350-591-111A	<b>Heli-Access-Step</b> ™, Long Step – High Skid
	X					D350-591-113	<b>Heli-Access-Step</b> ™, Short Step – High Skid
		X				D350-591-115	<b>Heli-Access-Step</b> ™, Short Step – Low Skid
			X			D350-591-117A	<b>Heli-Access-Step</b> ™, Pre-Flight Step
				X		D350-591-119	<b>Heli-Access-Step</b> ™, Long Step – Low Skid
					X	D350-591-133	<b>Heli-Access-Step</b> ™, Aft Maintenance Step
	1					D2310	STEP ASSEMBLY (HIGH-SHORT)
1						D2311	STEP ASSEMBLY (HIGH-LONG)
		1				D2354	STEP ASSEMBLY (LOW-SHORT)
				1		D2355	STEP ASSEMBLY (LOW-LONG)
					1	D2946-041	STEP ASSEMBLY (MAINTENANCE)
4	2	2	2	2		D2171	CLAMP
4	2	2	2	2		D2182B035	CUSHION
					4	D2230-1	MOUNTING LUG
					4	D2230-3	MOUNTING LUG
8	4	4	4	4		D2274	RADIUS BLOCK
			1			D2362-041	SUPPORT BRACKET
2	1			1		D2362-3	SUPPORT BRACKET
		1				D2362-5	SUPPORT BRACKET
2	1	1	1	1	2	D2856-400-720	ABRASION STRIP
					1	D2945	MOUNTING PLATE
2	2	2		2		AN3-37A	BOLT
					2	AN4-7A	BOLT
					4	AN4-11A	BOLT
					8	AN4-14A	BOLT
		4				AN4-16A	BOLT
8	4			4		AN4-20A	BOLT
1	1	1	4	1		AN4-22A	BOLT
4	4	4		4		AN960JD10	WASHER
10	6	2	4	6	14	AN960JD416	WASHER
		4				AN960JD416L	WASHER
2	2	2		2		MS21042L3	NUT
9	5	5	4	5	14	MS21042L4	NUT

Qty -121	Qty -122	Qty -123	Qty -124	Part Number	Description
X				D350-591-121	<b>Heli-Access-Step</b> ™, Short Step – High Skid, LH
	X			D350-591-122	<b>Heli-Access-Step</b> ™, Short Step – High Skid, RH
		X		D350-591-123	<b>Heli-Access-Step</b> ™, Short Step – Low Skid, LH
			X	D350-591-124	<b>Heli-Access-Step</b> ™, Short Step – Low Skid, RH
1				D2351-041	STEP ASSEMBLY (HIGH-SHORT, LH)
	1			D2351-042	STEP ASSEMBLY (HIGH-SHORT, RH)
		1		D2356-041	STEP ASSEMBLY (LOW-SHORT, LH)
			1	D2356-042	STEP ASSEMBLY (LOW-SHORT, RH)
1	1	1	1	D2230-1	MOUNTING LUG
1	1	1	1	D2230-3	MOUNTING LUG
1	1	1	1	D2856-400-720	ABRASION STRIP
2	2	2	2	AN3-37A	BOLT
3	3	3	3	AN4-13A	BOLT
4	4	4	4	AN960JD10	WASHER
6	6	6	6	AN960JD416	WASHER
2	2	2	2	MS21042L3	NUT
3	3	3	3	MS21042L4	NUT

REFERENCE ONLY

# DART SERVICE INSTRUCTION

TO AMEND INSTALLATION INSTRUCTIONS D350-591 REV. G OR EARLIER  
AND  
INSTRUCTIONS OF CONTINUED AIRWORTHINESS ICA-D350-591 REV. 2 OR EARLIER  
REF CANADIAN STC: SH92-6  
REF FAA STC: SH967NE

For D350-591-121/-122/-123/-124/-133 steps, customers have the option of installing D2732-030 cushions under the D2230-1/-3 clamps to accommodate varying crosstube diameters and to improve fit. It is also acceptable to use longer or shorter AN4 bolts, and/or extra AN960JD416 washers under the nut to ensure 1.5 to 4 threads in safety. See Figure 1 on sheet 2 of this service instruction for reference.

For D350-591-121/-122 steps at CHG 005, D350-591-123/-124 steps at CHG 004, and D350-591-133 steps at CHG 003, the parts list of D350-591 Rev. G and ICA-D350-591 Rev. 2 is amended as follows:


## ADD:







Qty -121	Qty -122	Qty -123	Qty -124	Qty -133	Part Number	Description
X					D350-591-121	Heli-Access-Step™, Short Step – High Skid, LH
	X				D350-591-122	Heli-Access-Step™, Short Step – High Skid, RH
		X			D350-591-123	Heli-Access-Step™, Short Step – Low Skid, LH
			X		D350-591-124	Heli-Access-Step™, Short Step – Low Skid, RH
				X	D350-591-133	Heli-Access-Step™, Aft Maintenance Step
2	2	2	2	8	D2732-030	CUSHION
2	2	2	2	8	AN4-16A	BOLT

The DSI-9459-011 kit is available for customers with earlier model D350-591-121/-122/-123/-124 steps. Longer AN4 bolts are provided to fasten the clamps. The DSI-9459-013 kit is available for customers with earlier model D350-591-133 steps.

Qty -011	Qty -013	Part Number	Description
X		DSI-9459-011	Rubber Cushion Kit (for -121/-122/-123/-124 steps)
	X	DSI-9459-013	Rubber Cushion Kit (for -133 steps)
2	8	D2732-030	CUSHION
2	8	AN4-16A	BOLT

CANADA  
DEPARTMENT OF TRANSPORT  
AIRCRAFT CERTIFICATION  
BRANCH  
DAO # 01-O-01

APPROVED  
BY:   
D. SHEPHERD (DE # 02)  
DATE: 09.06.24  
CERT. NO.: SH92-6  
ISSUE NO.: 11

B	AN4-16A WAS -17A FOR -013/-133 KIT	CP	09.06.24
A	NEW ISSUE	CP	09.04.17
REV.	DESCRIPTION	BY	DATE
DESIGN		<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA	
DRAWN			
CHECKED		DRAWING NO.	REV. B
MFG. APPR.		DSI 9459	SHEET 1 OF 2
APPROVED		TITLE	SCALE
DE APPR.		OPTIONAL CLAMP MODIFICATIONS	NTS
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